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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/427,260	10/25/1999	FARHAD KHOSRAVI	239/227	2937

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IP PROSECUTION DEPARTMENT  
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EXAMINER

PELLEGRINO, BRIAN E

ART UNIT PAPER NUMBER

3738

DATE MAILED: 06/21/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	09/427,260	KHOSRAVI ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Brian E Pellegrino	3738	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

1) ☒ Responsive to communication(s) filed on 29 March 2006.

2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.

3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

4) ☒ Claim(s) 29,30,55-57,59,60 and 62 is/are pending in the application.

4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.

5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.

6) ☒ Claim(s) 29,30,55-57,59,60 and 62 is/are rejected.

7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.

8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

9) ☐ The specification is objected to by the Examiner.

10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. §§ 119 and 120**

12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All   b) ☐ Some \* c) ☐ None of:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.

13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.  
a) ☐ The translation of the foreign language provisional application has been received.

14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

**Attachment(s)**

1) <input type="checkbox"/> Notice of References Cited (PTO-892)	4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____
2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)	5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)
3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) <u>5/19/06</u>	6) <input type="checkbox"/> Other:

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claims 55,57,59,62 are rejected under 35 U.S.C. 102(e) as being anticipated by Fogarty et al. (5800520). Fig. 9A shows a stent with a plurality of stretchable elements biased to expand from a contracted condition or are in an unstretched condition. Fig. 9B illustrates the stretchable elements in the stretched condition. Fogarty et al. disclose the stent is formed from a coiled-up sheet having overlapping inner and outer longitudinal sections, that is unrollable to an enlarged condition, col. 5, lines 4-11. Fogarty also discloses the sheet is made of a shape memory material, i.e. Nitinol, col. 6, lines 17-21. The sheet should be cooled at about 25 °C for martensitic transformation and heated to about body temperature for austenitic transformation, col. 6, lines 23-29. It is noted that Fogarty discloses that flexible or expandable elements can be formed with a serpentine pattern, which inherently forms wing-like elements with undulations, col. 4, lines 65-67. The wing-like elements extend “generally” parallel to the longitudinal axis.

Claims 29,30,55-57,59,60,62 are rejected under 35 U.S.C. 102(e) as being anticipated by Khosravi et al. (5824054). Fig. 6 shows a stent sheet of stretchable elements (col. 4, line 62) with a plurality of locking elements **51** extending from the inner longitudinal section for engaging openings in the outer longitudinal section. It can also be seen there are a plurality of wing-like elements **52**, which are sinusoidal or undulate

(col. 9, lines 29,30) with first and second members that extend generally parallel to the longitudinal axis. It can also be seen the wing-like elements are connected at a point intermediate a pair of elements. Khosravi et al. disclose the stent is formed of shape memory material that can be plastically deformable or biased to expand, col. 5, lines 55-67.

The applied reference has a common inventor with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

***Claim Rejections - 35 USC § 103***

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claims 29,30,56,60 are rejected under 35 U.S.C. 103(a) as being unpatentable over Fogarty et al. '520 in view of Khosravi et al. (5441515). Fogarty is explained supra. However, Fogarty does not disclose a plurality of locking elements extending from the inner section to the outer to secure the stent in the enlarged condition. Khosravi et al. teach (Figs. 4,5) a coiled sheet stent with a plurality of locking elements **25** that extend from the inner section to the outer section and secure the stent in an expanded condition. Khosravi teaches that locking elements are used on coiled sheet stents to prevent failure of the device, such that it maintains patency, col. 1, lines 49-51. It would

have been obvious to one of ordinary skill in the art to incorporate a plurality of locking elements in the coil sheet stent as taught by Khosravi et al. in the stent of Fogarty such that it remains in the enlarged condition and does not collapse in the patient, since it is important to restrain the stored force that is imparted in coiled devices.

### ***Response to Arguments***

Applicant's arguments filed 3/29/06 have been fully considered but they are not persuasive. Applicant argues that the "wing-like elements" disclosed by Fogarty do not extend in a direction "generally" parallel to the longitudinal axis. The use of "generally parallel" is terminology of relative degree, which has no basis of comparison. For this reason, it is considered broad and relatively unlimited. The examiner can interpret any line deviating from the radial direction to be "generally" parallel since Applicant has not set forth the boundaries that is intended to be encompassed by using "generally" parallel. Thus it can be said that Fogarty discloses wing-like elements "generally" parallel to the longitudinal axis. Regarding Applicant's comments about the Khosravi '054 patent that it does not disclose "stretchable elements" is unpersuasive because the '054 clearly discloses "stretchable" material or that which can be expanded, col. 5, lines 55-67. Applicant also argues that the '054 reference does not disclose the stent with the ability to deform plastically or be biased to expand, however, it appears the Applicant has overlooked the citation of col. 5, lines 55-67 in the patent that the Examiner referred to as mentioned above that supports the rejection since the materials listed are all capable of these functional limitations. In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that

Art Unit: 3738

obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, the Examiner clearly provided a motivation since Khosravi teaches (col. 1, lines 50-51) that the locking elements basically prevent any collapse or expansion of the stent beyond the desired expandable state. No surgeon or company manufacturing a stent device would want to have the stent collapse or expand too much in the patient and risk causing serious damage to the patient's lumen. Thus, it is an obvious expedient of incorporating the locking elements disclosed by Khosravi with the stent of Fogarty such that it provides a stable stent.

### ***Conclusion***

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any

Art Unit: 3738

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Brian E. Pellegrino whose telephone number is 571-272-4756. The examiner can normally be reached on Monday-Thursday from 7am to 4:30pm. The examiner can also be reached on alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Corrine McDermott, can be reached on 571-272-4754. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

TC 3700, AU 3738

  
**BRIAN E. PELLEGRINO**  
**PRIMARY EXAMINER**

